

Shuyang Li

shuyangli94@gmail.com ▪ shuyangli.me ▪ github.com/shuyangli94 ▪ (314)-660-6660
Office #4146, 9500 Gilman Dr, San Diego, CA 92122

EDUCATION

University of California, San Diego , San Diego, CA (PhD)	Exp. 2023
Advisor: Dr. Julian McAuley	
Area: Computer Science and Engineering, Machine Learning	
Princeton University , Princeton, NJ (BSE)	June 2016
Major: Operations Research and Financial Engineering	GPA: 3.71
Certificates: Applications of Computing; Statistics and Machine Learning	
Thesis: <i>Exploring Rich Features for Sentiment Analysis with Various Machine Learning Models</i>	

PUBLICATIONS

- Majumder, B.*, Li, S.*, Ni, J., McAuley, J. (2019). Generating Personalized Recipes from Historical User Preferences. *Empirical Methods in Natural Language Processing*.
- Li, S.*, Majumder, B.*, McAuley, J. (2019). Cooking Common Sense: Personalized Recipe ‘Tweak’ Inference via Common Sense Reasoning. *SoCal NLP Symposium*.
- Huang, D., Li, S., Dhaka, A., Story, G.M. and Cao, Y.Q., 2012. Expression of the transient receptor potential channels TRPV1, TRPA1 and TRPM8 in mouse trigeminal primary afferent neurons innervating the dura. *Molecular pain*, 8 (1), 66-85.

RESEARCH AND WORK EXPERIENCE

- University of California San Diego** September 2018-Present
Graduate Student Researcher
- Researching and developing models to incorporate knowledge, subjectivity, and personalization in dialogue/language modeling and generation at the intersection of NLP and recommender systems
 - Researcher, architect, and lead developer for the UCSD Amazon Alexa Prize Socialbot Grand Challenge team
- Google, Kaggle Datasets (Google Cloud AI)** June 2019-September 2019
Software Engineering Intern (PhD)
- Built a framework for automatically generating semantic tags for datasets based on free-text metadata
 - Implemented metrics for dataset discoverability and search success
 - Doubled size of tag ontology and tripled tag coverage across all public datasets on Kaggle.com
- Bloomberg, Structured Products Waterfall** June 2017-September 2018
Senior Software Engineer
- Designed and implemented a Spark-based infrastructure for high bandwidth data processing jobs
 - Modeled time series data for 2.5 million asset-backed securities (ABS)
 - Designed and implemented anomaly detection for ABS data passing through ETL and analytics pipelines
- Goldman Sachs, Operations Automation and Analytics Technology** July 2016-June 2017
Technology Analyst
- Helped build applications to consume, parse, & standardize market messages for fixed income instruments
 - Designed & built a machine learning platform to create metrics & predictive models for Operations division
- Princeton University, Senior Thesis Research** September 2015-May 2016
Senior Thesis Research
- Investigated SVMs, Naïve Bayes, and ensemble methods for binary sentiment analysis on movie reviews
 - Created a manually labeled corpus from 2004 Cornell IMDB data for subjective and summary sentences

Goldman Sachs, Operations Analytics Strategies

June 2015-August 2015

Summer Analyst

- Led team working on automated invoice recognition using Tesseract and Python to process and automate template matching with noisy and tilted images containing structured and semi-structured text

Princeton Laboratory for Energy Systems Analysis / CASTLE Lab

June 2014-August 2014

Summer Research Intern

- Created simulator in Java for the unit allocation problem of introduction of wind energy to the power grid
- Analyzed the role and performance of different classes of learning rates in reinforcement learning

HONORS AND AWARDS

Finalist, Amazon Alexa Prize SocialBot Grand Challenge 2019 (UCSD Team)

2019-2020